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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/828,793	04/20/2004	Edwin C. Iliff	HEWAYS.015A6D1	5083
20995 7590 06/02/2009 KNOBBE MARTENS OLSON & BEAR LLP 2040 MAIN STREET FOURTEENTH FLOOR IRVINE, CA 92614			EXAMINER ZHOU, SHUBO	
			ART UNIT 1631	PAPER NUMBER
			NOTIFICATION DATE 06/02/2009	DELIVERY MODE ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

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Office Action Summary

Application No.

10/828,793

Applicant(s)

ILIFF, EDWIN C.

Examiner

SHUBO (Joe) ZHOU

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 18 December 2008.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 6-18 and 20-42 is/are pending in the application.
- 4a) Of the above claim(s) 9, 15, 22-34, 36 and 39 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 6-8, 10-14, 16-18, 20-21, 35, 37-38; and 40-42 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- ☒ Notice of References Cited (PTO-892)
- ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- ☒ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date 8/7/08, 1/16/09.
- ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- ☐ Notice of Informal Patent Application
- ☐ Other: _____.

DETAILED ACTION

1. Applicants' elections of species A (disease object directly invokes another disease object), species D (each disease object is associated with a phase of one disease) and species F (each symptom object is associated with a sub-symptom of one symptom) in the response filed 12/18/08 is acknowledged. Because applicant did not distinctly and specifically point out the supposed errors in the restriction requirement, the election has been treated as an election without traverse (MPEP § 818.03(a)). .

Claims 6-18 and 20-42 are currently pending; claims 6-8, 10-14, 16-18, 20-21, 35, 37-38; and 40-42 are under examination, and claims 9, 15, 22-34, 36, and 39 have been withdrawn from further consideration pursuant to 37 CFR 1.142(b), as being drawn to a nonelected invention or species, there being no allowable generic or linking claim.

Claim Rejections - 35 USC § 101

2. The rejection of the claims under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter set forth in the Office action mailed 2/11/08 is hereby withdrawn in view of the amendment filed 8/7/08, where the claimed system is amended to comprise a processor and a digital storage device, which are interpreted as tangible hardware, and thus machine or apparatus.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

4. The rejection of claims 6-8, 10-14, 16-18, and 20-21 under 35 U.S.C. 103(a) as being unpatentable over Iliff, E. C. in view of Akers et al. set forth in the previous Office action mailed 2/11/08 is hereby withdrawn in view of applicant's argument that Akers et al. is not qualified as a prior art. Applicant's argument is found persuasive.

5. Claims 6-8, 10-14, 16-18, 20-21, 35, 37-38; and 40-42 are rejected under 35 U.S.C. 103(a) as being unpatentable over Iliff, E. C. (IDS document: US 5,935,060, Aug. 10, 1999) in view of Peifer et al. (US 5,987,519, Date of Patent: Nov. 16, 1999).

The claims are amended to be drawn to a system comprising a processor and digital storage device containing various objects selected from disease object, symptom

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object, valuator object, question object, node object, and candidate object, wherein each object has corresponding data and processes, and wherein the data is encapsulated.

Iliff discloses a medical diagnosis computer system comprising a computer system and database containing various data and scripts and software for using the system and the data for diagnosis. See at least the Abstract. The combination of data and scripts for manipulating the data is interpreted as reading on the "object" recited in the instant claims.

With regard to claims 6-7, the system of Iliff comprises at least a plurality of disease objects and a plurality of symptom objects. See at least Figs. 1, 3A-3B and Fig. 10, and columns 1-3. Further, in the system of Iliff, the script engine will execute an individual script which is linked to specific data. Thus, each object is only to see the script of another object, not the data. The system of Iliff's is stored in a server, harddrive or CD-ROM, which are hardware storage device and processor. See column 4.

However, Iliff does not disclose that the data in the objects are encapsulated so that they cannot be seen by a user.

Peifer et al. disclose a packaged based method and system for telemedicine for communicating video, voice and medical data that is encapsulated in package for sending over a network. Peifer et al. state that since the data information is encapsulated in packages, it can be sent over multiple types or combinations of network architectures including CATV, PSTN, ISDN, LAN, WAN, ATM, wireless network, etc. without the need of a separate protocol for each different type of transmission media. See at least the Abstract, Fig. 4.

It would have been obvious to one having ordinary skill in the art at the time of the instant invention to modify the system/method of Iliff to have the data encapsulated in packages so that it could be sent over multiple types or combinations of network architectures including CATV, PSTN, ISDN, LAN, WAN, ATM, wireless network, etc. without the need of a separate protocol for each different type of transmission media, as suggested and taught by Peifer et al.

With regard to claim 8, the system of Iliff comprises a "diagnostic script engine," which is interpreted to be the engine object recited in the claim. See at least Fig. 1B, and columns 1-3.

With regard to claim 10, the objects in the system of Iliff are arranged in a hierarchical relationship so that the result of one is the input of another. See at least Fig. 2, and columns 1-3.

With regard to claim 11, the system of Iliff comprises, in addition to the disease and symptom objects as in claims 6-7 above, also comprises question object, node object, valuator object and candidate objects. See at least Figures 7-15, and columns 1-3.

With regard to claims 12-14, and 18, the system of Iliff's comprises symptom, valuator and node objects, where symptom object invokes valuator object, which in turn invokes the question object, which then invokes the node object. See at least Fig. 4b and columns 1-3.

With regard to claims 16 and 17, Iliff discloses that a particular disease is associated with geographic information and diseases in a population and the frequencies therein. The system also comprises data and scripts for a plurality different diseases

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sharing common symptoms, such as "fever" shared by appendicitis, intestinal flu, food poisoning, and malaria. See at least column 8.

With regard to claim 20, Fig. 3B of Iliff shows that one disease object, e.g. disease object A, asks questions, and depending on the answers, the diagnostic process could stay on object A or goes to disease object B, which in turn asks questions, and again, depending on answers, it could to the next disease object, until finally, it may go to the last disease object X. Thus, disease object X is an object that monitors the questions and answers of the other disease objects.

With regard to claim 21, the system of Iliff comprises a script engine that coordinates all the entire process of diagnosis because it controls all the scripts. See at least columns 18-19.

With regard to the newly added claims 35, 37-38, Iliff discloses that a disease object directly invokes another disease object. See at least Fig. 14 and at least column 6. Iliff also discloses that the system users "list-based processing," i.e. it begins with a series of diseases, symptoms and questions. These lists are then processed into a playable script using a list-based script development tool. Each objects comprises scripts for questions for patients/users to answer, and once patients/users answered, the script development tool updates the disease scores and continues with the next symptom. Thus, those symptom and question data are constant data and the answers with update are variable data. See at least column 6.

With regard to new claims 40-42, dependent from claim 7, Iliff discloses that each disease object is associated with a series of symptoms, which are interpreted as phases of

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the disease because different symptoms are the manifestations of different phases of a disease. See column 6. Furthermore, Iliff discloses a time-based diagnostic scripts where the system provides multiple scripts, e.g. "one for each hour into the disease process," which are different phases of the disease. See column 8. Iliff also discloses that symptom object is also associated with "implied symptoms," i.e. a symptom established based on the presence of absence of another symptom. See column 9. This implied symptom is interpreted as a sub-symptom of the instant claim 42.

6. Applicant's arguments filed 8/7/08 have been fully considered but they are not persuasive with respect to Iliff. The argument is mainly on the ground that the Office erred in interpreting what is disclosed in Iliff, i.e. the combination of list data and scripts for manipulating the data as an object of the instant invention. This is not found persuasive because as admitted by applicant in the same response, the instant specification explicitly defines that "an object is a combination of data and processes that manipulate that data" in paragraph [0066] of the published application. Iliff clearly disclose a combination of data, scripts, and scripts engines and other algorithms for manipulating the data, and it thus meets the definition for the term in the instant specification even though some of the examples of object may have properties "beyond this simple combination."

With regard to applicant's argument about Akers, it is not moot as the rejection relying on Akers is withdrawn as set forth earlier in this action.

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Nonstatutory Double Patenting

7. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. See *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and, *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent is shown to be commonly owned with this application. See 37 CFR 1.130(b).

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

8. Claims 6-8, 10-14, 16-18, 20-21, 35, 37-38; and 40-42 are provisionally rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claims 6-8, 20- 30 and 49-50 of US copending Application No. 09/785,044.

This rejection is reiterated from the previous Office action.

Applicant's argument that the instant claims have been amended and thus different from the claimed invention of the copending application. This is not found persuasive because the amendment mainly added "a processor" to implement the objects and "a digital storage device" for storing the objects. It would have been obvious to one having ordinary skill in the art at the time of the invention that for a method and system to be used by a computer system, a processor and a storage device to store the objects would have been a must and thus would have modify the invention of claims 6-8, 20- 30 and 49-

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50 of US copending Application No. 09/785,044 to include a processor and a storage device.

9. Claims 6-8, 10-14, 16-18, and 20-21 are rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claims 1-14 of US 6,527,713 B2, Mar. 4, 2003 in view of Peifer et al. (US 5,987,519, Date of Patent: Nov. 16, 1999).

Claims 1-14 of US 6,527,713 are drawn to a method and a system comprising different objects as those recited in the instant claims. However, claims 1-14 of US 6,527,713 do not recite that the data are encapsulated.

As set forth above, Peifer et al. disclose a packaged based method and system for telemedicine for communicating video, voice and medical data that is encapsulated in package for sending over a network. Peifer et al. state that since the data information is encapsulated in packages, it can be sent over multiple types or combinations of network architectures including CATV, PSTN, ISDN, LAN, WAN, ATM, wireless network, etc. without the need of a separate protocol for each different type of transmission media. See at least the Abstract, Fig. 4.

It would have been obvious to one having ordinary skill in the art at the time of the instant invention to modify the invention of 1-14 of US 6,527,713 to have the data encapsulated in packages so that it could be sent over multiple types or combinations of network architectures including CATV, PSTN, ISDN, LAN, WAN, ATM, wireless

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network, etc. without the need of a separate protocol for each different type of transmission media, as suggested and taught by Peifer et al.

Applicant's argument with regard to Akers et al. is moot as Peifer et al. is now relied upon.

Conclusion

10. No claim is allowed.

11. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Shubo (Joe) Zhou, whose telephone number is 571-272-0724. The examiner can normally be reached Monday-Friday from 8 A.M. to 4 P.M. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Marjorie Moran, can be reached on 571-272-0720. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Patent applicants with problems or questions regarding electronic images that can be viewed in the Patent Application Information Retrieval system (PAIR) can now contact the USPTO's Patent Electronic Business Center (Patent EBC) for assistance. Representatives are available to answer your questions daily from 6 am to midnight (EST). The toll free number is (866) 217-9197. When calling please have your application serial or patent number, the type of document you are having an image problem with, the number of pages and the specific nature of the problem. The Patent Electronic Business Center will notify applicants of the resolution of the problem within 5-7 business days. Applicants can also check PAIR to confirm that the problem has been corrected. The USPTO's Patent Electronic Business Center is a complete service center supporting all patent business on the Internet. The USPTO's PAIR system provides Internet-based access to patent application status and history information. It also enables applicants to view the scanned images of their own application file folder(s) as well as general patent information available to the public. For all other customer support, please call the USPTO Call Center (UCC) at 800-786-9199.

/Shubo (Joe) Zhou/

SHUBO (JOE) ZHOU, PH.D.

PRIMARY EXAMINER